

J. PIPING DETAILS

Elite VWH with Storage Tank

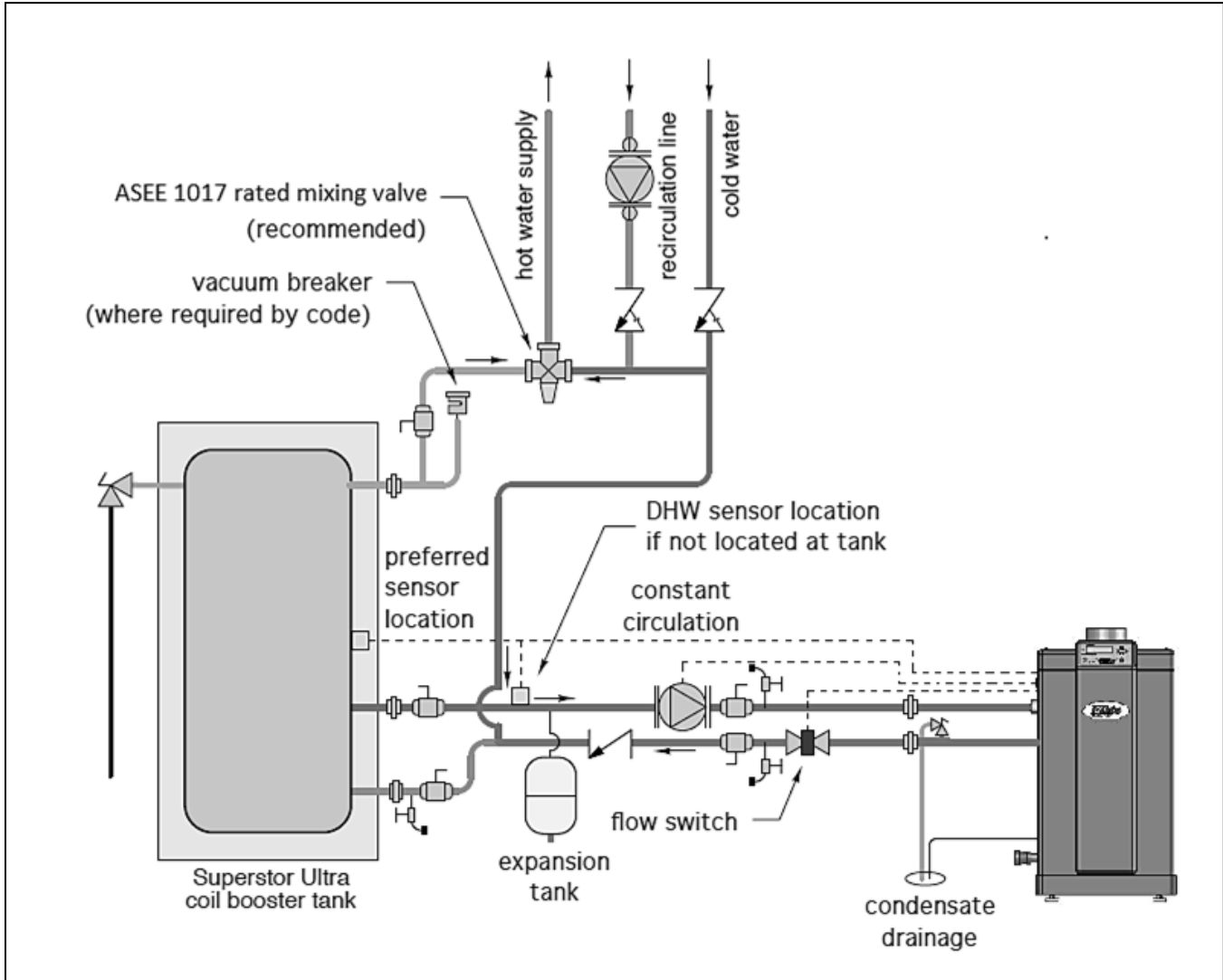


Figure 7

NOTES:

1. This drawing is meant to show system piping concept only. Installer is responsible for all equipment & detailing required by local codes.
2. Heater circulator must be rated for open loop application. Do not use cast-iron circulators.
3. Heater circulator(s) operate continuously.
4. Piping to the water storage tank must be at least the size of the heater return and supply connections.
5. See Table 9 for minimum pipe sizing.
6. All pipes are shown with isolation flanges or full port ball valves for isolation. The alternative is standard flanges with full port ball valves and a separate flow check valve.
7. Install a minimum of 12 diameters of straight pipe upstream of all circulators and check valves.
8. Install vacuum relief valve in accordance with local code requirements.
9. All multiple heaters and multiple storage tanks must be installed with reverse return piping as shown.
10. Anti-scald rated mixing valve is recommended on all tanks if the hot water temperature leaving the tank is above 119°F.
11. Expansion tank must be rated for use with potable water.
12. Use either indirect/tank sensor or system/pipe sensor mounted on common return to the heater.
13. Aquastat or system/pipe sensor connects to DHW sensor input on heater.

Elite VWH with Two Storage Tanks

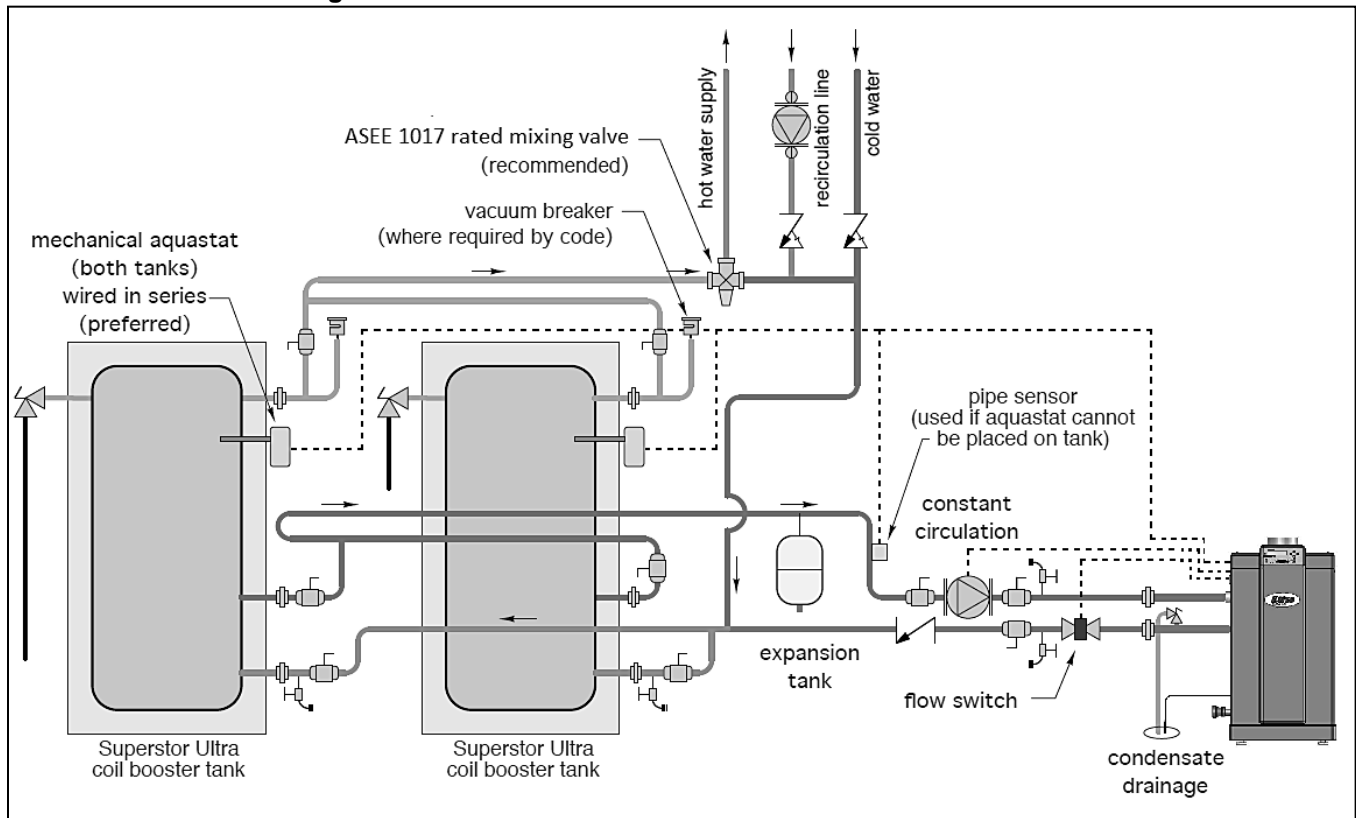


Figure 8

NOTES:

1. This drawing is meant to show system piping concept only. Installer is responsible for all equipment & detailing required by local codes.
2. Heater circulator must be rated for open loop application. Do not use cast-iron circulators.
3. Heater circulator(s) operate continuously.
4. Piping to the water storage tank must be at least the size of the heater return and supply connections.
5. See Table 9 for minimum pipe sizing.
6. All pipes are shown with isolation flanges or full port ball valves for isolation. The alternative is standard flanges with full port ball valves and a separate flow check valve.
7. Install a minimum of 12 diameters of straight pipe upstream of all circulators and check valves.
8. Install vacuum relief valve in accordance with local code requirements.
9. All multiple heaters and multiple storage tanks must be installed with reverse return piping as shown.
10. Anti-scald rated mixing valve is recommended on all tanks if the hot water temperature leaving the tank is above 119°F.
11. Expansion tank must be rated for use with potable water.
12. Use either indirect/tank sensor or system/pipe sensor mounted on common return to the heater.
13. Aquastat or system/pipe sensor connects to DHW sensor input on heater.

Two Elite VWH Heaters with Storage Tank

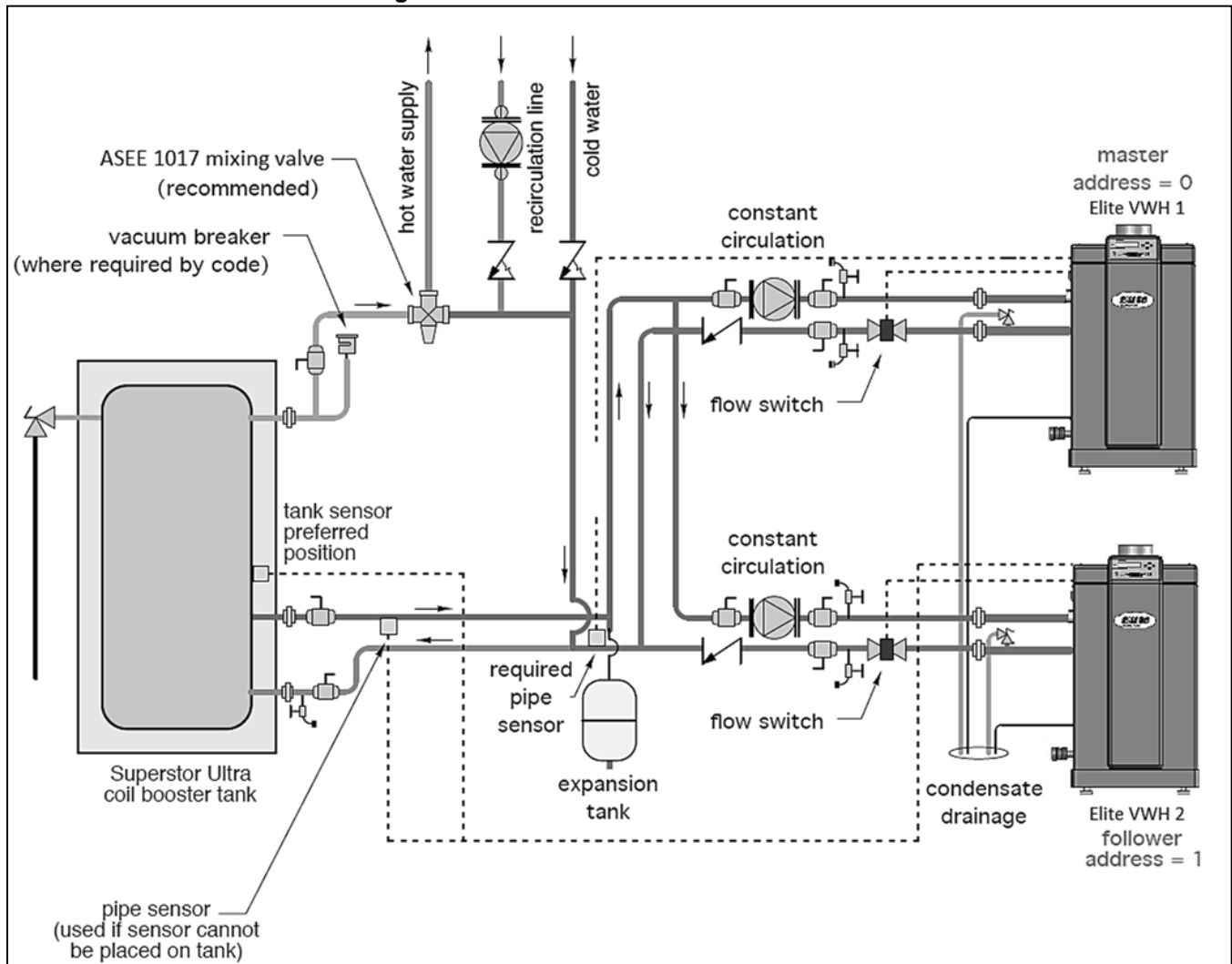


Figure 9

NOTES:

1. This drawing is meant to show system piping concept only. Installer is responsible for all equipment & detailing required by local codes.
2. Heater circulator must be rated for open loop application. Do not use cast-iron circulators.
3. Heater circulator(s) operate continuously.
4. Piping to the water storage tank must be at least the size of the heater return and supply connections.
5. When using multiple heaters, see Tables 6, 7, and Figure 7 for pipe sizing.
6. All pipes are shown with isolation flanges or full port ball valves for isolation. The alternative is standard flanges with full port ball valves and a separate flow check valve.
7. Install a minimum of 12 diameters of straight pipe upstream of all circulators and check valves.
8. Install vacuum relief valve in accordance with local code requirements.
9. All multiple heaters and multiple storage tanks must be installed with reverse return piping as shown.
10. Anti-scald rated mixing valve is recommended on all tanks if the hot water temperature leaving the tank is above 119°F.
11. Expansion tank must be rated for use with potable water.
12. Use either indirect/tank sensor or system/pipe sensor mounted on common return to the heater.
13. Aquastat or system/pipe sensor connects to DHW sensor input on heater.

Three Elite VWH Heaters with Two Storage Tanks

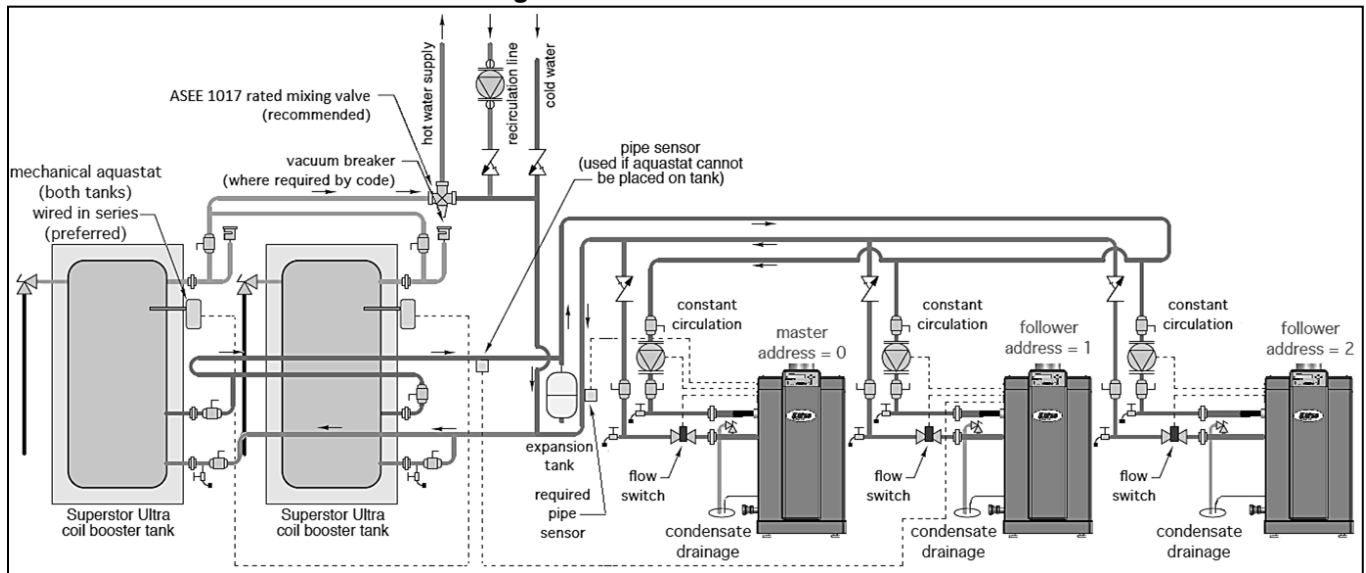


Figure 10

NOTES:

1. This drawing is meant to show system piping concept only. Installer is responsible for all equipment & detailing required by local codes.
2. Heater circulator must be rated for open loop application. Do not use cast-iron circulators.
3. Heater circulator(s) operate continuously.
4. Piping to the water storage tank must be at least the size of the heater return and supply connections.
5. When using multiple heaters, see Tables 6, 7, and Figure 7 for pipe sizing.
6. All pipes are shown with isolation flanges or full port ball valves for isolation. The alternative is standard flanges with full port ball valves and a separate flow check valve.
7. Install a minimum of 12 diameters of straight pipe upstream of all circulators and check valves.
8. Install vacuum relief valve in accordance with local code requirements.
9. All multiple heaters and multiple storage tanks must be installed with reverse return piping as shown.
10. Anti-scald rated mixing valve is recommended on all tanks if the hot water temperature leaving the tank is above 119°F.
11. Expansion tank must be rated for use with potable water.
12. Use either indirect/tank sensor or system/pipe sensor mounted on common return to the heater.
13. Aquastat or system/pipe sensor connects to DHW sensor input on heater.

PART 5 – VENTING, COMBUSTION AIR, AND CONDENSATE REMOVAL

⚠ DANGER

The heater must be vented as detailed in this Venting Section. Ensure exhaust and intake piping complies with these instructions. Inspect finished combustion air intake and exhaust piping thoroughly to ensure all joints are well secured, airtight, and comply with all applicable code requirements, as well as with the instructions provided in this manual. Failure to properly install the vent system will result in severe personal injury or death.

A. GENERAL

⚠ DANGER

This vent system will operate with positive pressure in the pipe. Do not connect vent connectors serving appliances vented by natural draft into any portion of mechanical draft systems operating under positive pressure. Follow these venting instructions carefully. Failure to do so will result in substantial property damage, severe personal injury, or death.